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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/822,853	04/02/2001	Hyun-doo Shin	Q59547	7185

7590 03/12/2007  
SUGHRUE, MION, ZINN,  
MACPEAK & SEAS, PLLC  
2100 PENNSYLVANIA AVENUE, N.W.  
WASHINGTON, DC 20037-3213

EXAMINER

LE, BRIAN Q

ART UNIT	PAPER NUMBER
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2624

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	03/12/2007	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

**Office Action Summary**

Application No.

09/822,853

Applicant(s)

SHIN ET AL.

Examiner

Brian Q. Le

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 21 December 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 14-17, 19, 21-24 and 30-33 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 14-17, 19, 21-24 is/are allowed.
- 6) ☒ Claim(s) 30-33 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>10/26/04; 12/11/06</u> . | 6) <input type="checkbox"/> Other: _____  |

***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 12/21/2006 has been entered.

***Claim Rejections - 35 USC § 102***

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 30-33 are rejected under 35 U.S.C. 102(b) as being anticipated by Chang, "Data Resource Selection in Distributed Visual Information Systems", I.E.E.E. Knowledge and Data Engineering, Volume. 10, pages: 926-946 November 1998.

Regarding claim 30, Chang teaches a method of measuring a similarity (FIG. 3) between texture features (visual content) (abstract) of a first image and a second image (abstract), the method comprising the steps of:

(a) computing a statistical dissimilarity (similarity measure/computation) between the first and second images (Page 928, column 2, last two paragraphs);

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(b) computing a perceptual dissimilarity (visual similarity) between the first and second images (Page 926, column 2, second paragraph); and

(c) computing a dissimilarity (weight similarity determination) between the texture features of the first and second images based on the statistical dissimilarity and the perceptual dissimilarity (Page 938, first column, first paragraph),

wherein the step (c) comprises the steps of :

(c-1) determining the dissimilarity between the texture features as a value proportional to the statistical dissimilarity when the perceptual dissimilarity is smaller than a predetermined threshold (Page 929, second column specifically observation 1); and

(c-2) determining the dissimilarity between the texture features based on the statistical dissimilarity (page 928, column 2, 2<sup>nd</sup> paragraph and page 930, column 2, 3.3 Query Processing), when the perceptual dissimilarity is smaller than a predetermined threshold (Page 929, second column specifically observation 1).

For claim 31, Chang further teaches the method wherein the step (b) comprises the steps of:

(b-1) computing regularity of the texture of the first and second images (Page 932, second column); and

(b-2) computing a dissimilarity between the computed regularities of texture of the first and second images (Page 932).

Referring to claim 32, Chang teaches the method wherein the step (c-1) determines the dissimilarity between the texture features (abstract and Page 928, column 2, last two paragraphs) as a value proportional to the statistical dissimilarity (page 928, column 2, 2<sup>nd</sup>

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paragraph and page 930, column 2, 3.3 Query Processing) when the perceptual dissimilarity is smaller than a predetermined threshold (Page 929, second column specifically observation 1).

For claim 33, Chang also teaches the method wherein the step (c-2) determines the dissimilarity between the texture features (abstract and Page 928, column 2, last two paragraphs) based on an exponent of the power of the statistical dissimilarity (page 932, column 2, equations 5-7), the exponent being the perceptual dissimilarity (page 932, column 2, paragraph 2 and paragraph 3), when the perceptual dissimilarity is smaller than a predetermined threshold (Page 929, second column).

***Allowable Subject Matter***

4. Claims 14-17, 19, and 21-24 allowed. There is no prior art found that teaches the equation to determine textural dissimilarity as claimed.

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**CONCLUSION**

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Brian Q. Le whose telephone number is 571-272-7424. The examiner can normally be reached on 8:30 A.M - 5:30 P.M.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mathew Bell can be reached on 571-272-7778. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



BL

March 6, 2007